



# UNITED STATES PATENT AND TRADEMARK OFFICE

UNITED STATES DEPARTMENT OF COMMERCE  
United States Patent and Trademark Office  
Address: COMMISSIONER FOR PATENTS  
P.O. Box 1450  
Alexandria, Virginia 22313-1450  
[www.uspto.gov](http://www.uspto.gov)

APPLICATION NO.	FILING DATE	FIRST NAMED INVENTOR	ATTORNEY DOCKET NO.	CONFIRMATION NO.
10/849,515	05/20/2004	Hajime Nakagawa	FS-F03334-01	7131
37398	7590	07/12/2005		
TAIYO CORPORATION			EXAMINER	
401 HOLLAND LANE			CHEA, THORL	
#407				ART UNIT
ALEXANDRIA, VA 22314				PAPER NUMBER
			1752	

DATE MAILED: 07/12/2005

Please find below and/or attached an Office communication concerning this application or proceeding.

<b>Office Action Summary</b>	<b>Application No.</b>	<b>Applicant(s)</b>	
	10/849,515	NAKAGAWA ET AL.	
	<b>Examiner</b>	<b>Art Unit</b>	
	Thori Chea	1752	

-- The MAILING DATE of this communication appears on the cover sheet with the correspondence address --  
**Period for Reply**

**A SHORTENED STATUTORY PERIOD FOR REPLY IS SET TO EXPIRE 3 MONTH(S) FROM THE MAILING DATE OF THIS COMMUNICATION.**

- Extensions of time may be available under the provisions of 37 CFR 1.136(a). In no event, however, may a reply be timely filed after SIX (6) MONTHS from the mailing date of this communication.
- If the period for reply specified above is less than thirty (30) days, a reply within the statutory minimum of thirty (30) days will be considered timely.
- If NO period for reply is specified above, the maximum statutory period will apply and will expire SIX (6) MONTHS from the mailing date of this communication.
- Failure to reply within the set or extended period for reply will, by statute, cause the application to become ABANDONED (35 U.S.C. § 133). Any reply received by the Office later than three months after the mailing date of this communication, even if timely filed, may reduce any earned patent term adjustment. See 37 CFR 1.704(b).

**Status**

- 1) Responsive to communication(s) filed on 20 May 2005.  
 2a) This action is FINAL.                    2b) This action is non-final.  
 3) Since this application is in condition for allowance except for formal matters, prosecution as to the merits is closed in accordance with the practice under *Ex parte Quayle*, 1935 C.D. 11, 453 O.G. 213.

**Disposition of Claims**

- 4) Claim(s) 1-15 is/are pending in the application.  
 4a) Of the above claim(s) \_\_\_\_\_ is/are withdrawn from consideration.  
 5) Claim(s) \_\_\_\_\_ is/are allowed.  
 6) Claim(s) 1-15 is/are rejected.  
 7) Claim(s) \_\_\_\_\_ is/are objected to.  
 8) Claim(s) \_\_\_\_\_ are subject to restriction and/or election requirement.

**Application Papers**

- 9) The specification is objected to by the Examiner.  
 10) The drawing(s) filed on \_\_\_\_\_ is/are: a) accepted or b) objected to by the Examiner.  
     Applicant may not request that any objection to the drawing(s) be held in abeyance. See 37 CFR 1.85(a).  
     Replacement drawing sheet(s) including the correction is required if the drawing(s) is objected to. See 37 CFR 1.121(d).  
 11) The oath or declaration is objected to by the Examiner. Note the attached Office Action or form PTO-152.

**Priority under 35 U.S.C. § 119**

- 12) Acknowledgment is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f).  
 a) All    b) Some \* c) None of:  
 1. Certified copies of the priority documents have been received.  
 2. Certified copies of the priority documents have been received in Application No. \_\_\_\_\_.  
 3. Copies of the certified copies of the priority documents have been received in this National Stage application from the International Bureau (PCT Rule 17.2(a)).

\* See the attached detailed Office action for a list of the certified copies not received.

**Attachment(s)**

- |   |   |
|---|---|
| 1) <input checked="" type="checkbox"/> Notice of References Cited (PTO-892)   | 4) <input type="checkbox"/> Interview Summary (PTO-413)                     |
| 2) <input type="checkbox"/> Notice of Draftsperson's Patent Drawing Review (PTO-948)  | Paper No(s)/Mail Date. _____  |
| 3) <input checked="" type="checkbox"/> Information Disclosure Statement(s) (PTO-1449 or PTO/SB/08)<br>Paper No(s)/Mail Date <u>05202004</u> . | 5) <input type="checkbox"/> Notice of Informal Patent Application (PTO-152) |
|   | 6) <input type="checkbox"/> Other: _____                                    |

**DETAILED ACTION**

1. This is a first office action responsive to the filing of this instant application on May 20, 2004; claims 1-13 are pending.

***Claim Rejections - 35 USC § 103***

2. The following is a quotation of 35 U.S.C. 103(a) which forms the basis for all obviousness rejections set forth in this Office action:

(a) A patent may not be obtained though the invention is not identically disclosed or described as set forth in section 102 of this title, if the differences between the subject matter sought to be patented and the prior art are such that the subject matter as a whole would have been obvious at the time the invention was made to a person having ordinary skill in the art to which said subject matter pertains. Patentability shall not be negated by the manner in which the invention was made.

3. Claims 1-13 are rejected under 35 U.S.C. 103(a) as being unpatentable over Ito (US Patent No. 6,458,505).

Ito discloses a photothermographic material and a process substantially as claimed. See columns 61-64, claims 1-21 wherein the material contains a photosensitive silver halide, a non-photosensitive organic silver salt, a nucleating agent and binder; a reducing agent in column 29, lines 25-67 to column 30; the use of polymer latex in the image forming layer, protective layer and back layer in column 33, lines 51-67; the use of the polymer latex having glass transition of -30 °C to 40 °C in the image forming layer and a back layer preferably has a glass transition of 25 °C to 70 °C in column 34, lines 45-65; the polymer latex in column 34, lines 66-67 to column 35 including the acrylic resins , polyvinylchloride resin etc.; the water-soluble polymers used as thickener for imparting coating property such as gelatin, polyvinyl alcohol and acrylic acid in column 39, lines 53-67 to column 40, lines 1-45; the surfactant including anionic and fluorinate surfactant

in column 40, lines 46-57 to column 41. See also the process of developing the photothermographic material Fig. 1 and the description thereof in column 37, lines 1-60.

1. Ito fails to exemplify the use of the polymer latex having glass transition of 25 °C to 70 °C in combination with water-soluble polymer. However, it would have been obvious to the worker of ordinary skill in the art at the time the invention was made to use the water-soluble polymer to impart the coating property of the polymer latex in the backing layer, and thereby provide a material as claimed. Ito may not prefer the use of the polymer latex having glass transition lower than 25 °C such as presented in claim 4. However, the worker of ordinary skill in the art would have been found obvious to the worker of ordinary skill in the art even though that selection is not preferred. Nonpreferred embodiments can be indicative of obviousness. Merck & Co. v. Biocraft Laboratories Inc. 10 USPQ 2d 1843 (Fed. Cir. 1989); In re Lamberti 192 USPQ 278 (CCPA 1976); In re Kohler 177 USPQ 399 (CCPA 1973); In re Mill 176 USPQ 196 (CCPA 1972); In re Bozek 163 USPQ 545 (CCPA 1969); In re Meinhardt 157 USPQ 270 (CCPA 1968); In re Boe 148 USPQ 507 (CCPA 1976); In re Nehrenberg 126 USPQ 383. In this case, the worker of ordinary skill in the art would have a reasonable expectation of success. The amount of latex presented in claims 2-3 would have been found obvious to the worker of ordinary skill in the art in the absence of showing the criticality thereof. [W]here the general conditions of a claim are disclosed in the prior art, it is not inventive to discover the optimum or workable ranges by routine experimentation." In re Aller, 220 F. 2d 454, 105 USPQ 233, 235 (CCPA 1955)."

***Conclusion***

Art Unit: 1752

4. The prior art made of record and not relied upon is considered pertinent to applicant's disclosure. The references provided with the information disclosure statement on May 20, 2004 has been considered and made of record

5. Any inquiry concerning this communication or earlier communications from the examiner should be directed to Thorl Chea whose telephone number is (571) 272-1328.

The examiner can normally be reached on 9 AM-5:30 PM.

If attempts to reach the examiner by telephone are unsuccessful, the examiner's supervisor, Cynthia H. Kelly can be reached on (571)272-1526. The fax phone number for the organization where this application or proceeding is assigned is 703-872-9306.

Information regarding the status of an application may be obtained from the Patent Application Information Retrieval (PAIR) system. Status information for published applications may be obtained from either Private PAIR or Public PAIR. Status information for unpublished applications is available through Private PAIR only. For more information about the PAIR system, see <http://pair-direct.uspto.gov>. Should you have questions on access to the Private PAIR system, contact the Electronic Business Center (EBC) at 866-217-9197 (toll-free).

Tch   
July 8, 2005

  
Thorl Chea  
Primary Examiner  
Art Unit 1752